

a modified form of *Pseudodiadema*, and has probably arisen from the adoption of a deep-sea life resulting in diminished calcification of the test.

2. 'On *Echinocystis* and *Palæodiscus*, two Silurian Genera of Echinoidea.' By J. W. Gregory, D.Sc., F.G.S.

The Author gives a history of the genera *Echinocystis*, Salter, and *Palæodiscus*, Wyv. Thoms., redescibes their structures, and discusses their affinities. He concludes that *Echinocystis* is an echinid and not a cystid; and that *Palæodiscus* is an echinid and not an asterid. In order to prevent confusion, he suggests the name *Scolocystis* for a true cystid which was described by Hall as *Echinocystis*, some years after the latter name had been applied by Wyville Thomson to the fossil now concluded to be an echinid; and also suggests the name of *Discocystis* for the form named *Echinodiscus* by Worthen and Müller.

In discussing the affinities of *Echinocystis*, Wyv. Thoms., the two latest diagnoses of the Cystoidea (those of Prof. von Zittel and Prof. Haeckel) are considered, and it is contended that they do not enable us to draw any sharp line of distinction between cystids and echinids.

It is shown that the masticatory apparatus of *Palæodiscus* and *Echinocystis* explain the origin of that structure in gnathostomate echinids; and furthermore, it is suggested that *Echinocystis* renders probable the homology of the so-called 'calycinal plates' of the Echinoidea with the plates of the valvular pyramid of the Cystoidea, and not with the calyx-plates.

The Author gives synopses of the order Cystoicidaroidea of Prof. von Zittel, and of its two families, Palæodiscidæ and Echinocystidæ.

## MISCELLANEOUS.

*To the Editors of the 'Annals and Magazine of Natural History.'*

*The Generic Name of the River Crayfish.*

GENTLEMEN,—It is unnecessary for me to reply to the Rev. Mr. Stebbing at any length.

(i.) Reference to vol. xi. of the Trans. Linn. Soc. will confirm the accuracy of my remark as to Leach's treatment of *Astacus* and *Nephrops*. I am surprised at Mr. Stebbing supposing that I cited an anonymous article of uncertain date.

(ii.) Mr. Stebbing appears to be unaware of rule 2 of the rules proposed by the British Association for zoological nomenclature. What is there said of Brisson applies literally to Gronovius, and the genera of the one author are as good as those of the other.

(iii.) Does not Mr. Stebbing know that 1758 has been well called by the most eminent of the exponents of the zoological works of

Linnaeus "the zoological *ab urbe condita* of binominal chronology"? and that before 1890.

(iv.) If Desmarest had not said that Leach's *Potamobius* was a river-crab one might have ascribed *Potamobius apud* Samouelle to Leach; but as it is, Samouelle must take the responsibility for his ill-advised method of using Leach's MSS.

(v.) Mr. Stebbing has no right to lead us to suppose that *Potamobius* was not preoccupied; he shows himself to be incapable of recognizing the name when it is absolutely forced under his eyes, for he says of Desmarest that he "would probably have accepted Leach's *Potamobius* had he ever heard of it," and that after I had quoted a sentence of Desmarest passing an opinion on the value of that very name. So entranced has Mr. Stebbing been by the details of my autobiography, that he has missed the kernel of my argument.

(vi.) How one text-book can copy another either peacefully or otherwise I know not; but, if Mr. Stebbing means to gibe at Huxley, Milne-Edwards, Carus, Claus, Gegenbaur, Hertwig, and Boas, he has been guilty of an offence of which I hope he has already repented.

I am, Gentlemen,

Your obedient Servant,

F. JEFFREY BELL.

*A Gigantic Cephalopod on the Florida Coast.*

By A. E. VERRILL.

Mr. R. P. Whitfield has forwarded to the writer the following letter from Dr. Webb to Mr. J. A. Allen, dated St. Augustine, Fla., Dec. 8th, 1896:—

"You may be interested to know of the body of an immense *Cetopus* thrown ashore some miles south of this city. Nothing but the stumps of the tentacles remain, as it had evidently been dead for some time before being washed ashore. As it is, however, the body measures 18 feet in length by 10 feet in breadth. Its immense size and condition will prevent all attempts at preservation. I thought its size might interest you, as I do not know of the record of one so large."

The proportions given above indicate that this may have been a squid-like form, and not an *Octopus*. The "breadth" is evidently that of the softened and collapsed body, and would represent an actual maximum diameter in life of at least 7 feet, and a probable weight of 4 to 5 tons for the body and head. These dimensions are decidedly larger than those of any of the well-authenticated Newfoundland specimens. It is, perhaps, a species of *Architeuthis*. Professor Steenstrup recorded many years ago a species of this genus (*A. dux*)\*, taken in 1855 in the West-Indian seas; but his example was much smaller than the one here recorded.—*Amer. Journ. Sci.*, January 1897, p. 79.

\* See Trans. Connecticut Acad. vol. v.; also Report U.S. Fish Com. for 1879, p. 51, pl. xii. fig. 4.